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## Termite Control in Existing Structures

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## TERMITE CONTROL IN EXISTING STRUCTURES

It is not difficult to identify termites and termite damage. However, people often mistake winged ants for termites and become unnecessarily alarmed. Actually, the difference is quite pronounced. A swarmer termite is generally black in color, has a rather straight body and four cloudy white wings equal in length and twice as long as the body. The winged ant, on the other hand, may be similar in color but has a wasp-like waist and four clear wings unequal in length and much shorter.

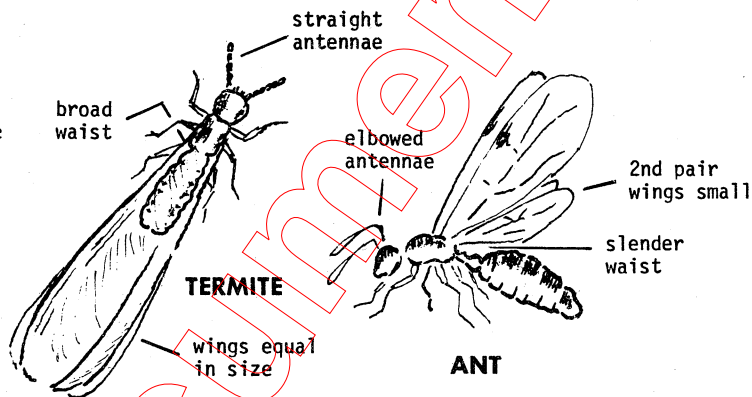
The white, soft-bodied worker termites, although seldom seen are the ones that do the damage. They eat the soft grain of wood, leaving a thin shell outside and a splinter effect inside.

### WHEN AND HOW TO CHECK FOR DAMAGE

A termite's natural habitat includes stumps, posts and other wood that comes in contact with the ground. Because termites may be found in these materials near the home does not necessarily mean the home is or will be infested. To check for termites, probe any wood near the foundation or soil with an ice pick or screw driver, especially the plates, header joists, ends of floor joists, and any hardwood flooring. Presence of earthen "shelter tubes" on foundation walls and wood is also evidence of infestation. Termites build the tubes from bits of soil, which they also use to close up breaks in the surface of infested wood.

If you find damage, there is no great hurry to apply control measures. Termites work slowly, and a few weeks' or even months' delay is of little consequence. If you plan to use commercial pest control service,

reck carefully into the experience and reliability of the operators in your community.



### PRINCIPLES OF CONTROL

Termites need wood for food and soil for moisture. Wood in contact with soil is ideal for termite development. But if this does not occur, the insects may build shelter tubes to bridge or span foundation walls and other masonry that separate wood from soil. Tubes are constructed on the walls or inside them in voids or cracks. Occasionally termites are established without soil contact when a leaky roof or pipe provides moisture.

Infestations often develop in soil under slabs of concrete, such as garage floors, patios and filled porches. From here, the termites enter the building through structural wood or foundation walls adjacent to the slab. In cases of houses built partly or completely on slabs, infestation is through expansion joints, cracks and utility openings.

The basic principle of termite control is to break the connection between wood and soil. This is done by laying down a chemical barrier to eliminate all possible points of entry. Any one of the insecticides listed in Table 1 can be used for this purpose.

### WHERE AND HOW TO TREAT

In most cases, termite control is a job

for professional pest control specialists. Homeowners seldom have the training or equipment. The following paragraphs outline the procedures necessary for adequate control, regardless of who applies them.

#### Treating Foundation Walls

Soil on both sides of exposed foundation walls and soil surrounding supports should be soaked down to the foundation footing with any one of the chemicals listed in Table 1 at a rate of 4 gallons per 10 linear feet per foot of depth. Application is made by trenching or a combination of trenching and rodding.

For outside basement walls (where the footing is deep), a V-shaped trench is dug against the wall. It should be at least a foot deep, or deeper if necessary to insure penetration to the footing. Soil at the bottom of the trench can be loosened with a spade or iron bar to allow further penetration.

After trenching, most pest control specialists apply the chemical by injecting it along the foundation through a perforated hollow rod attached at the end of the hose in place of a spray nozzle. This is "rodding." The result is a continuous chemical barrier from footing to surface.

Walls of concrete block should be drilled above the grade line and all voids flooded with 2 gallons of insecticides per 10 linear feet. When treating old stone and brick foundations, specialists may also inject insecticides under pressure beneath the sill to flood any voids in the walls.

#### Treating Concrete Slabs Against Foundations

If concrete for garage floors, patios, walks, etc. was poured against foundations of the house, the soil under the slabs which lies next to the foundations must also be treated. This is done by drilling the slab

Table 1. Insecticides for termite control

Insecticide and formulation*		Concentration to use	Dilution	
			Parts Water	Parts EC
aldrin	4 lb./gal. (43.4%) EC	0.5%	96	1
chlordane	8 lb./gal. (72%) EC	1.0%	96	1
dieldrin	1.5 lb./gal. (18.7%) EC	0.5%	36	1
heptachlor	2.5 lb./gal. (27.8%) EC	0.5%	60	1

\*The amount of actual toxicant per gallon of concentrate may vary from one formulation to another. Read the label and be sure of concentration before making dilutions.  
EC = Emulsifiable Concentrate.

at 12-inch intervals next to the foundation wall and injecting the chemical under pressure at a rate of 4 gallons per 10 linear feet.

#### Treating Filled Porches

Filled porches are treated one of two ways. (1) The slab can be drilled as described above or the porch foundation drilled at each end next to the building, and the chemical injected by rodding. Or (2) the porch can be excavated at each end next to the building foundation and the area treated with chemical at 4 gallons per 10 linear feet. Also spray the foundation wall and undersurface of the slab.

#### Treating Slab-constructed Buildings

Slab buildings infested by termites require professional service. Treatment involves saturating much of the soil beneath the slab. The chemical is injected either (1) through holes drilled in the slab at 12-inch intervals next to all foundation walls, interior partitions and utility openings, or (2) by rodding from outside the building. Either method must be carefully executed since heat pipes, vapor barriers, etc. may be located under the slab.

If treating by method 1, insecticide should be applied at the rate of 4 gallons per 10 linear feet. If saturating beneath the slab by method 2, the insecticide rate is 1 gallon per 10 square feet.

#### Treating Timbers and Adjoining Wood

Breaking the connection between wood and soil usually causes termites in the wood to die. But they may survive for a while if the wood is wet. Pest control specialists can solve this problem by chemically treating the wood. They may also add a decay preventive such as pentachlorophenol.